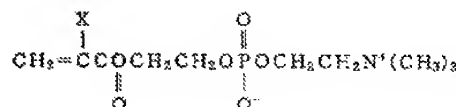


Patent Abstracts of Japan

PUBLICATION NUMBER : 10045794  
PUBLICATION DATE : 17-02-98



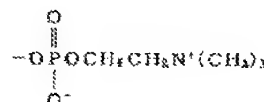
APPLICATION DATE : 31-07-96  
APPLICATION NUMBER : 08202367

APPLICANT : RES DEV CORP OF JAPAN;

I

INVENTOR : ISHIHARA KAZUHIKO;

INT.CL. : C07K 1/00 C07K 14/00 C07K 16/00  
C08L 89/00 C08L 101/00 C12N 9/96  
C12Q 1/25 // A61K 38/00 A61K 38/16  
A61K 38/43



TITLE : STABILIZATION OF PROTEIN AND  
COMPOSITION

II

ABSTRACT : PROBLEM TO BE SOLVED: To stabilize various proteins used for clinical medicines, clinical diagnosis, medical devices, etc., without regard to states by the coexistence of a specific polymer having phosphorylcholine groups with a protein in the same system.

SOLUTION: (A) A polymer, having phosphorylcholine group represented by formula II and obtained by polymerizing a phosphorylcholine group-containing monomer represented by formula I (X is H or methyl) [e.g. 2-(meth) acryloyloxyethyl-2'-(trimethylammonio)ethyl phosphate] and having the phosphorylcholine group represented by formula II in an amount of  $1.0 \times 10^{-6}$  to 20wt.% is mixed with (B) a protein such as a blood plasma pharmaceutical preparation protein (e.g. an albumin pharmaceutical preparation) in an amount of  $1.0 \times 10^{-14}$  to 20wt.% and (C) a buffer solution (e.g. a disodium hydrogenphosphate/sodium dihydrogenphosphate buffer solution) in an amount of 0-99.9wt.% to thereby stabilize various proteins used for clinical medicines, clinical diagnosis or medical devices, etc., without regard to a preservation state.

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